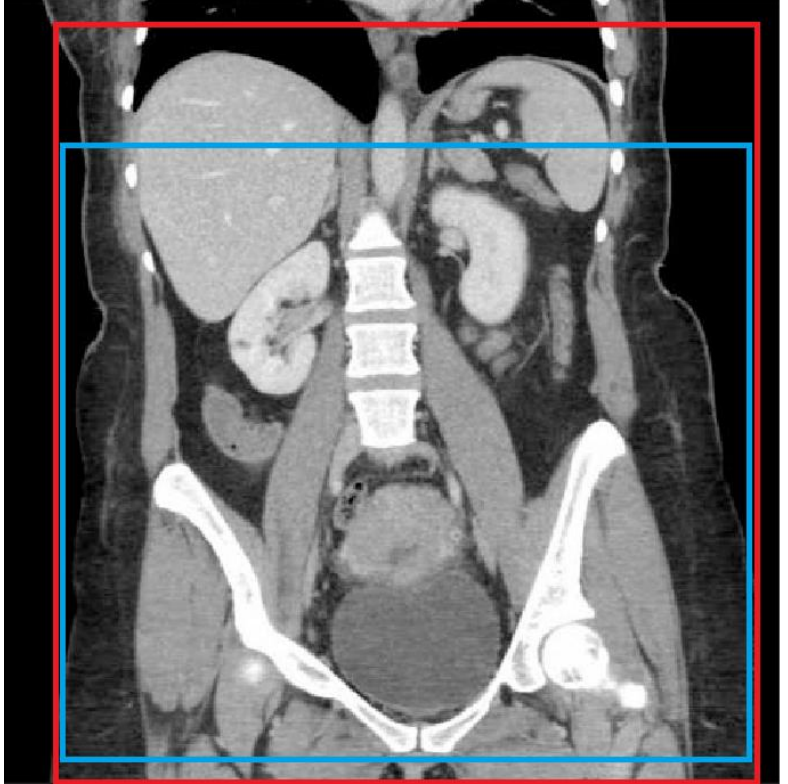


CT Urogram

Position/Landmark	Feet first supine
Scout	Diaphragm (above the dome of the liver) to lesser trochanters 
Scan coverage	Above the dome of the liver to the lesser trochanters
Respiratory Phase	Inspiratory
Scan Type	Helical
IV access	18g or 20g
Pediatric IV contrast	2ml/kg per patient's weight. OMNI 300 @ 1.0-2.5ml/sec.
PO Prep	May need to drink water, PO+, or barium depending on radiologist protocol
Contrast	130ml Omni 350 @ 2.5mL/sec – 3.0 mL/sec - Split bolus technique is used: 1st bolus 90ml at 3mL/sec - 15-minute pause - 2nd bolus 40ml at 3 mL/sec
Reason for exam	evaluate the urinary tract for cancer in pt with hematuria

Scan Settings – CT Urogram (Same for each phase unless noted otherwise)			
	Siemens SOMATOM Force	Philips iCT/Ingenuity	Canon Aquilion ONE Vision (non con abd, medullary, excretory)
kV Setting:	CAREkV Ref kV= 120	120	120
mA/mAs/TCM Setting:	CAREdose4D QRM = 147, Dose Slider Settings at 3 for non con, 7 for other phases	DoseRight DRI = 19, Liver DRI Boost +3	SureExposure3D (SD=11.5)
Iterative Reconstruction Setting:	Admire Strength 3	iDose 3	AIDR 3D Standard

Scan and Recon Instructions - CT Urogram	
1.	NON-CONTRAST axial (Renal Colic WO study) (Red box) - Axial 3mm x 1.5mm (soft tissue) - Coronal 3mm x 1.5mm (soft tissue) - Sagittal 3mm x 1.5mm (soft tissue)
2.	Corticomedullary phase: 55 second delay. (Blue box) Scan above Kidneys and below bladder. Use Urogram contrast protocol. Start first contrast bolus of 90ml (Use first non-contrast scan to plan this) - Axial 3mm x 1.5mm (soft tissue)
3.	15-minute delay. - Relax patient's arms down.
4.	After 15-minute delay bring patient's arms back up and second contrast bolus of 40mL will began.
5.	COMBINED NEPHROGRAPHIC / EXCRETORY PHASE of abdomen and pelvis at 17 minutes. (Blue box) - Axial 3mm x 1.5mm -(soft tissue) - Coronal 3mm x 1.5mm (soft tissue) - Sagittal 3mm x 1.5mm (soft tissue) - Coronal 5mm x 2.5mm MIP (soft tissue) - Sagittal 5mm x 2.5mm MIP (soft tissue)
6.	Make sure ureters and bladder have visible contrast. If a segment of the ureter is non-opacified on the combined neprographic/excretory phase you do not need to call the rad for possible repeat. However, if the collecting system is dilated and there is minimal to no contrast in the ureter on either side please call to check if repeated needed.

